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000 last epidemic of Asiatic cholera which swept the country in 1867 and 1868.

752 SNAKE BITES.—Guaco (*Mikania* sp.) is one of the various plants used as an antidote to the virulence of snake bites, not only by the Indians but by the Ladinos and Creoles as well. In order to neutralize the venom, the sukya also administers an infusion prepared from the bark and leaves of a leguminous shrub or small tree, called *daka*, while the *brum sirpi* weed is applied externally. The patient must abstain from eating food of which snakes are supposed to be fond. A woman *enciente* must under no condition be seen by the patient, otherwise the latter will die.

278 BUSH MEDICINES.—The Indians know a great number of bush medicines (M.: *sika;* T. and P.: *panbas, panabas;* U.: *dibasta*) for external or internal use. Many native plants and trees are employed, the bark, roots, leaves, and seeds being utilized. The white, delicious resin of the copal or incense tree (*Protium* sp.), copaiba balsa (*Copaifera officinalis* L.), Peru balsam (*Myroxylon pereirae* Klotzsch syn. *Toluifera pereirae* Baill.; M. and S.: *bakus*), the gum of the locust tree (*Hymenaea courbaril* L.; M.: *lâsa, laka;* S.: *tipi*), ipecacuanha (*Uragoga ipecacuanha* or *Polygala costaricensis*), sarsaparilla (*Smilax officinalis*), and unguents prepared from the oils extracted from the seeds of various trees are employed in the treatment of certain infections and sores.

The yellow milk of a small tree, known locally as "samboo gum" or "leche baría" (M.: *samu;* S.: *pûmaba*), is applied in poultices for rheumatism; it is also said to cure the *bulpis* skin disease, when the latter is still in its first stage.

The seeds of the piñon (*Jatropha curcas* L.; M. and S.: *pisik*) and the antidote bean (*Fevillea cordifolia* L.; M.: *mukula;* S.: *mula*) are administered as an emetic and as a purgative. The medicinal properties of the castor-oil plant (*Ricinus communis* L.; S.: *unapalan*), which grows wild on the river banks, are well known. De Candolle, however, believes this plant to be of Old World origin; curiously enough, the Miskito have no native name for it.

Toothache is cured with the milk of the cachito tree (*Tabernaemontana donnell-smithii* Rose; M.: *buksa mahóra;* S.: *wako*); the latter is also used for skin troubles.

An ill-smelling herb reaching about a foot in height and known as fit weed (*Eryngium* sp.; M. and S.: *kisûri*) is used for snake bites and epileptic fits. The Ladinos call it "culantro" (coriander) and use it as a condiment, but it must not be confounded with the true coriander (*Coriandrum sativum* L.), which is cultivated sometimes in Central American gardens under the name "culantro de Castilla."

The roots of the cerrón cantil or barsja (M.: *sus sûika;* S.: *tata, daka, tisliñ*) enter into remedies for venereal diseases. The bitter-

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paraphernalia of these doctors, small specimens being considered more efficacious than large ones. One of these celts is wrapped around the aching part of the body in order to relieve pain. In case of stomachic troubles the sukya administers drinking water wherein such a celt had been deposited for some time.

TREATMENT.—The sukya heals generally in the dark, especially after sundown. His methods of approach are prescribed by custom. First he imposes a general fast or perhaps only minor restrictions in diet on the patient, and occasionally on some of the latter's near relations likewise. Food which the patient is allowed to eat is known as *byñaku* (M.) and *kuñ* (S.). Sometimes the sukya ties a knotted cord round the legs, arms, breast, or neck of the patient, and the latter must abstain from the use of certain food, from salt and chili pepper, and observe continence for as many days as there are knots in the cord.

The cure proper consists in whistling over the sick person, blowing tobacco smoke over him, and massaging and sucking the afflicted body parts. The sukya purifies the drinking water, or any other beverage intended for the patient, by exposing it to the dew for some time, and then blowing into it with a bamboo rod or a tobacco pipe so as to produce bubbles. Painted sticks of hardwood are stuck in the ground around the bed of the sick person in order to keep evil spirits away. The sukya walks or dances around the sick bed, singing or muttering mysterious and incomprehensible words which are supposed to belong to the "spirit language." If a remedy does not seem to do any good, the sukya tries another one, just as does his learned confrère in more civilized countries.

Nobody must pass to windward of the house where the patient is undergoing a treatment, as one would kill the latter by "robbing him of air and breath." Should these orders be trespassed the sukya will exact a fine from the guilty ones. A woman *encinta* or with an infant must also keep out of sight as she might cause the death of both patient and sukya; these same restrictions apply also to any person of either sex having assisted shortly before at a burial.

Should the sick person not become any better, or even die eventually, the sukya will claim that his instructions had not been carried out carefully. Generally he ascribes such a calamity to disobedience in food restrictions. The actual or presumed breach of the above-named injunctions affords a convenient loophole for lack of success in the treatment.

Surgical operations are sometimes practiced by the sukya with the aid of splinters from broken glass bottles or bones, and chips of flint or obsidian. As antiseptics he uses ashes, tobacco, beeswax, and gums from certain trees.